UNITED STATES PATENT OFFICE.

JAMES P. N. ADAMS; OF GRAND RAPIDS, MICHIGAN.

CARPET-SWEEPER BRUSH.

1,370,256.

Specification of Letters Patent.

Patented Mar. 1, 1921.

Application filed August 21, 1920. Serial No. 405,132.

To all whom it may concern:

Be it known that I, James P. N. Adams, citizen of the United States, residing at Grand Rapids, in the county of Kent and 5 State of Michigan, have invented certain new and useful Improvements in Carpet-Sweeper Brushes, of which the following is a specification.

My invention relates to improvements in 10 carpet sweeper brushes, and its objects are; first, to provide a sweeper brush with which the dust, &c., may be thoroughly extracted from a carpet, and, second, to provide a brush that may be placed in parallel lines 15 around its shaft or may be twisted around the shaft.

This invention relates to improvements upon the patent issued to me May 21, 1918, No. 1,267,304, wherein the brushes were 20 made of sheet rubber.

A further object to be attained with this invention is to mount all the rubber wings of the brush upon a pliable rubber core, cylindrical in form.

I attain these objects by the construction shown in the accompanying drawing, in which Figure 1 is a plan of my roller with its wings placed parallel with the shaft. Fig. 2 shows the wings twisted upon the shaft, and Fig. 3 is a cross section of the shaft showing the radial positions of the brush wings.

Similar numerals indicate similar parts throughout the several views of the draw-

In the construction of this brush I so mold the rubber that I may form a cylindrical body 4 of a proper size to pass, snugly, over the shaft 1, and integral with this body I form radiating wings 2, preferably having a number of openings, 5, therethrough for the passage of air, covered in my prior patent, hereinbefore identified. It will be readily understood that when this cylindri-cal body is passed over the shaft 1 it is but a simple matter to take hold of the ends of the brush with both hands and twist it around the shaft by drawing in one direction with one hand, and pushing in the other

direction with the other hand and thus to 50 cause the wings 2 to be twisted part of the way around the shaft, where it may be secured by any available means, as, for instance, by means of tacks, as indicated at 6 in Fig. 2.

To fully carry out my invention, I vulcanize, or otherwise secure short lengths of bristles into the edges of the wings, with the ends of the bristles projecting a short distance outwardly from the edges of the 60 wings, as at 3 in Figs. 1 and 3.

It will be readily understood that by this means I am enabled to place the wings upon the shaft in any position I may desire, either parallel and straight, a regular twist, 65 curved, or otherwise, without any manipulation except the positioning of the wings as they are being placed upon the shaft and before securing them in place.

If desired the cylindrical body may be ce-70 mented upon the shaft when no tacks, or their equivalents will be necessary, and the effect upon the working of the brush will not be affected in the least degree.

Having thus fully described my invention, 75 what I claim as new in the art, is:

1. In a carpet sweeper brush, a supporting shaft, a flexible cylindrical body mounted upon said shaft, flexible wings integral with, and radiating from said body and extending 80 lengthwise thereof, and small bristling members projecting from the free edges of said wings.

2. In a carpet sweeper brush, a soft rubber cylindrical body having radiating wings 85 formed longitudinally thereof and integral therewith, and a row of bristles extending outwardly from the edges of the wings.

3. In a carpet sweeper brush, a soft rubber cylindrical body, soft rubber wings radiating from the body and integral therewith, said wings punctured with air passages, and bristles embedded into, and extending outwardly from the edges of the wings.

Signed at Grand Rapids, Mich., August 14, 1920.

JAMES P. N. ADAMS.